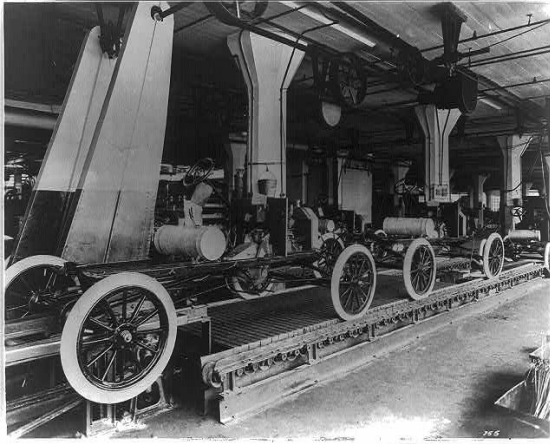


Where  
the past  
is present

# DETROIT HISTORICAL SOCIETY

# EDUCATOR LESSON PLAN

## ON THE ASSEMBLY LINE



Henry Ford Highland Park  
plant. C 1911

Courtesy of the Library of  
Congress

### INTRODUCTION

Through the activities and information found in this lesson, second grade students will develop a base understanding of economic production and labor. By having students actually participate in a working assembly line, they will apply what they learned through the reading and make connections to real-life activity.

### LEARNING OBJECTIVE

Students will:

- Understand the role Detroit played in the automobile industry and Henry Ford's development of assembly lines in his factories.
- Explain how an assembly line can be an efficient process for making products.
- Use the assembly line process to explain the meaning of division of labor.

### Learning Standards

#### Living and Working Together in Communities

2 – H2.0.1 Demonstrate chronological thinking by distinguishing among years and decades using a timeline of local community events.

2 – H2.0.3 Explain how individuals and groups have made significant historical changes.

2 – H2.0.6 Construct a historical narrative about the history of the local community from a variety of sources.

#### Human Systems

2 – G4.0.2 Describe the means people create for moving people, goods, and ideas within the local community.

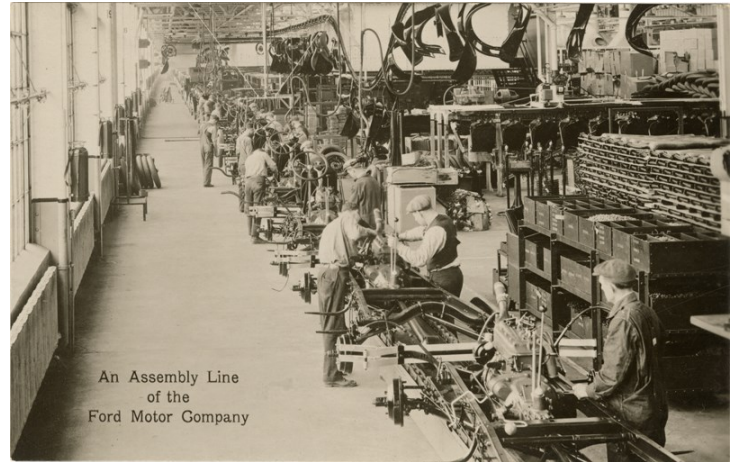
Where  
the past  
is present

# DETROIT HISTORICAL SOCIETY

# EDUCATOR LESSON PLAN

## BACKGROUND

From the late 1800s to the present, cars have been an important industry in Detroit. In the 1920s, Detroit became known as the Automobile Capital of the World because so many cars were produced here. Detroit is still known as “The Motor City” today. The first time a gasoline-powered car was driven in Detroit was in March 1896 by Charles B. King. A few months later, Henry Ford drove the car he had been working on in the shed behind his house onto the streets of Detroit. The first cars manufactured were individually constructed with the same person putting all the parts together. In 1913, Henry Ford began a new way of making cars. He used an assembly line to build cars. Instead of employees all working on one car at a time, a car would move along a belt as it was being put together. Workers added parts to the car as it moved along. By using an assembly line, Ford would make cars faster and cheaper. The first hand-made Oldsmobile's sold for \$2,382. The mass-produced models sold for about \$625. Henry Ford's first car, which he called the “Quadricycle,” and the shed where it was built can be seen at Greenfield Village. Ford's popular Model T sold for as little as \$275. By 1924, Ford's assembly line technique began to put ownership of an automobile within reach of most Americans.



Ford Motor Company - Highland Park plant. C 1911

Courtesy of the Detroit Public Library

In 1914, ten thousand men sought jobs at Ford's Highland Park Plant, responding to Henry Ford's offer of an unprecedented \$5-a-day wage for autoworkers, more than double the prevailing pay rate for an eight-hour day. Ford's theory proved correct; pay workers more, reduce turnover in the plant, and make more cars more efficiently. Sales increased, prices dropped, and the workers could afford to buy the Model T's they built. Factors leading to the establishment of the

auto industry in Detroit included the availability of skilled labor, investment dollars from those who had exploited timber and mining, and the raw materials for paints, chemicals, metal parts, plus gasoline used by the local boating industry.

## **MATERIALS USED**

- Reading: “On the Assembly Line”
- Pictures: Automobile assembly lines
- Picture: Henry Ford and the Quadricycle
- Envelope
- Stamp/stickers
- Stopwatch/Timer

## **LESSON SEQUENCE**

### *Opening the Activity*

1. Show pictures of assembly lines on an automobile manufacturing plant.  
Questions for class discussion:
  - What are the workers doing?
  - Can you see a finished car?
  - Why or why not?
  - How is the work divided?
2. Show a picture of Henry Ford together with his Quadricycle.
  - How is this picture different from the pictures of the automobile plant? How is it the same? Why?

### *Developing the Activity*

1. Ask six students to come to the front of the class. Have one student work alone while four others work as a team. Their project will be to fold a piece of paper,

insert it into an envelope, put an address/saying on it, and put a stamp/sticker on the envelope. Have individuals and the team each assemble five letters. Have each team member perform one specific task: one to fold the letter, one to put the letter into the envelope, one to place the address label on the envelope and one to put the stamp on the envelope. Tell them NOT to seal the envelope.

2. The sixth student will serve as a timekeeper, recording the time to complete the task for both the individual and the team.

### *Concluding the Activity*

1. Discuss how long it took the group to complete the task verses how long it took one student to complete the task, and which was more efficient.
2. Discuss why division of labor produces goods faster.

### *Extending the Activity*

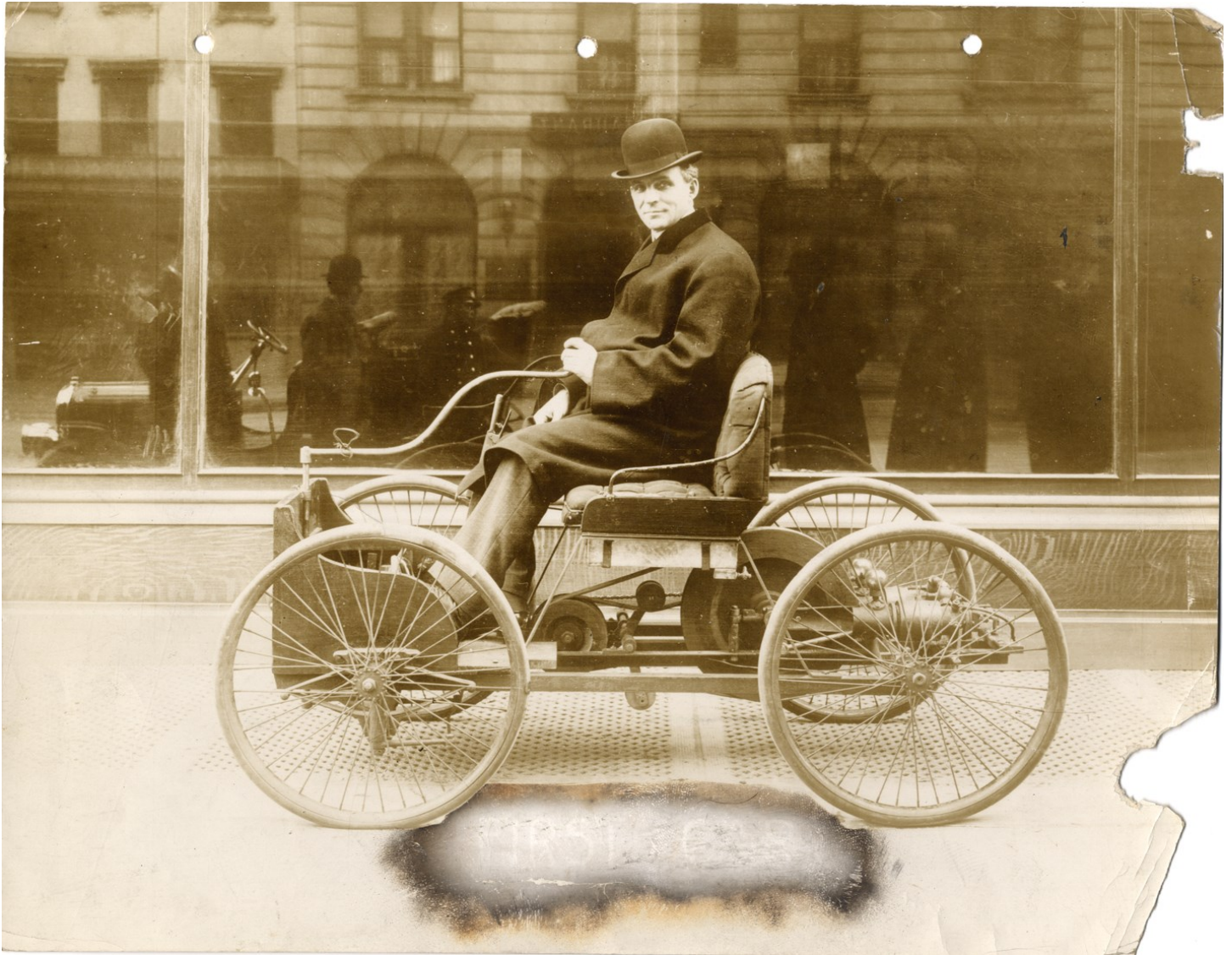
1. Plan a trip to an automobile plant to see workers on the assembly line
2. Attached is a template of a 3D car, see how well, they can apply these skill of assembly to papercraft.

## **ASSESSING THE LEARNING**

- Have students draw pictures illustrating the process of making cars on the assembly lines.
- Have them design their own car and write about the uniqueness of their creation.



PICTURE: HENRY FORD AND THE QUADRICYCLE  
c. 1896



*Courtesy of the Detroit Public Library*

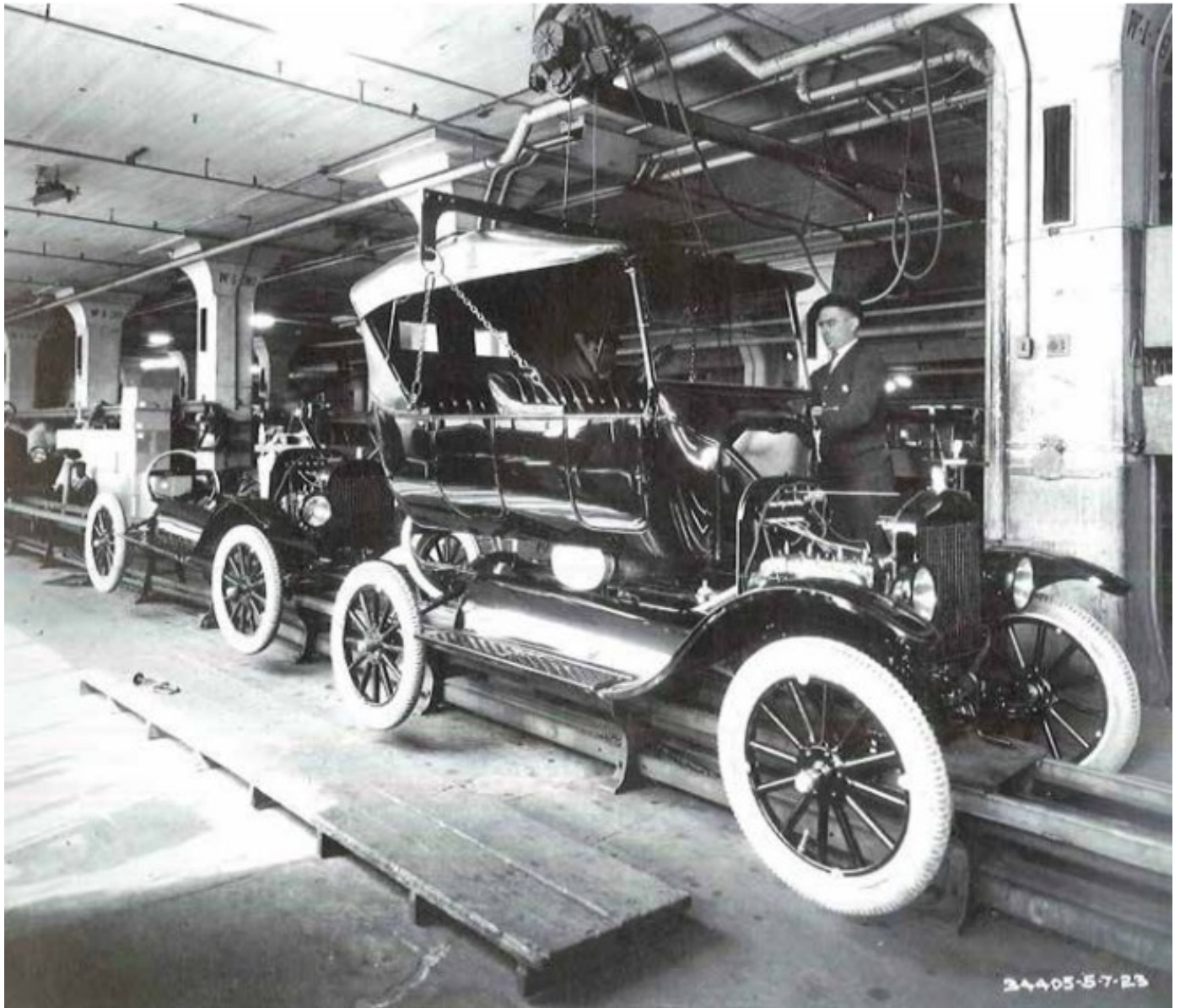
**PICTURE: MAGNETO ASSEMBLY LINE, HIGHLAND PARK PLANT  
c. 1913**



*Courtesy of the Walter P Reuther Library, Wayne State University*

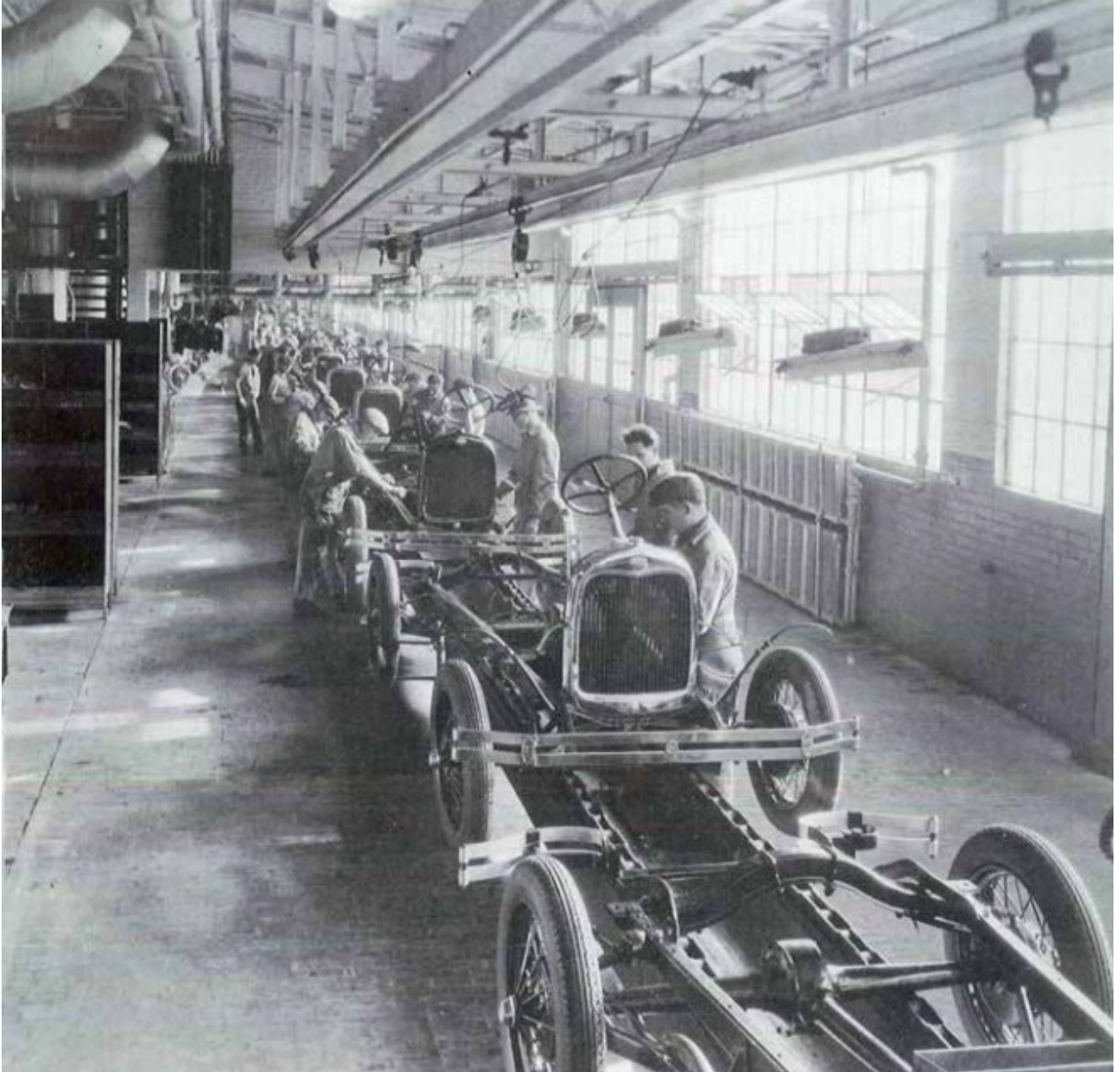


**PICTURE: FORD MODEL T ASSEMBLY LINE**  
c. 1923



*Courtesy of the Walter P Reuther Library, Wayne State University*

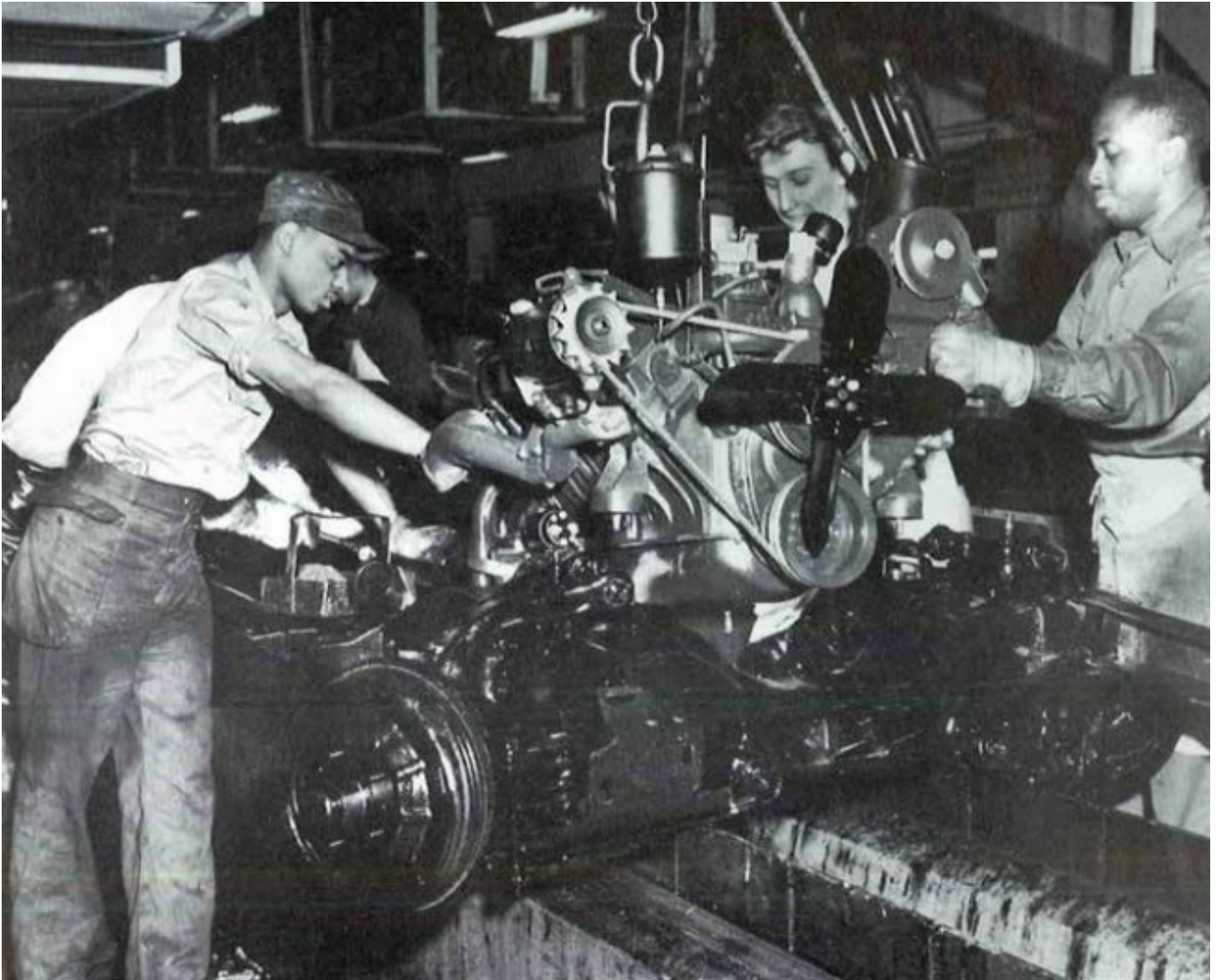
**PICTURE: FORD ASSEMBLY**  
c. 1929



*Courtesy of the Walter P Reuther Library, Wayne State University*



PICTURE: CADILLAC PLANT ASSEMBLYLINE  
c. 1955



*Courtesy of the General Motors Media Archive*



# 3D Car Assembly

Materials Needed:

- Scissors
- Tape
- Creativity!

